

ARCHITECTURE ENGINEERING

ANNING OUR
'NTS' SUCCESS

January 3, 2005

Constance Holland, AICP
Delaware State Office of Planning Coordination
540 S. Dupont Highway, Suite 7
Dover, DE 19901

RE: Preliminary Land Use Service FIELDSTONE DEVELOPMENT

Woodside, Delaware 2004100.00

Dear Miss. Holland:

The Delaware Office of State Planning Coordination reviewed the Fieldstone project through their Preliminary Land Use Service (PLUS) process on July 28, 2004. The following are the PLUS comments received by the various state agencies, with our response in italics:

#### Office of State Planning Coordination

This project is located in Investment Level 1 according to the June 3 version of the 2004 State Strategies for Policies and Spending, which has been approved by the Cabinet Committee for State Planning Issues. This site is also located in the Kent County Growth Zone. Investment Level 1 reflects areas that are already developed in an urban or suburban fashion, where infrastructure is existing or readily available, and where future redevelopment or infill projects are expected and encouraged by state policy. This project is a mixed-use project providing commercial, office, and residential uses. Our office supports mixed use infill and redevelopment projects as essential to the Livable Delaware strategy of concentrating growth in and around existing communities and infrastructure. This is the type of project that is highly desirable to allow us to meet our goals of revitalizing our already urbanized areas while protecting agricultural lands and natural resource areas from encroachment by sprawling suburban and rural development. The Office of State Planning Coordination has no objections to the proposed rezoning and development of this project in accordance with the relevant county codes and ordinances.

No response required.

# **State Historic Preservation Office (SHPO)**

There is a high probability for archaeological sites within the subject property. The applicant or developer can contact the SHPO office with any questions or concerns.

No response required.

#### **Department of Transportation**

A sight distance analysis will be required as part of the entrance plan submissions.

38 SOUTH GOVERNORS AVE DOVER, DELAWARE 19904 302.734.7950 FAX 302.734.7965

SOUTHBANK OFFICE PARK 307 A STREET WILMINGTON, DELAWARE 19801 302.888.2600 FAX 302.888.2427

PORT EXCHANGE
SUITE 300
312 WEST MAIN ST.
SALISBURY, MARYLAND 21801
410.546.9100
FAX 410.546.5824





We will provide the site distance analysis on the entrance plan.

The site layout shows 24-foot wide ingress and egress lanes. Generally the maximum lane width that DelDOT will permit for ingress or egress is 16 feet from face of curb to face of curb.

We will work with DelDOT to resolve this comment.

The site plan also shows swales along Delaware Route 10. Due to problems in other areas, the Department is paying increased attention to stormwater facilities proposed near the right-of-way. While the proposed swales may be the best way to handle drainage from the site, they will be subject to further review.

The stormwater facilities will meet Delaware Sediment and Stormwater Regulations. Therefore, we will not increase the runoff to the swales along Route 10.

A right-turn deceleration lane on Route 10 will likely be required, so the developer should determine whether the existing shoulder meets DelDOT's structural requirements for a right-turn lane, or the shoulder will have to be reconstructed. If a right-turn lane is required then a 5' wide bicycle lane will also have to be included.

We will work with DelDOT to resolve this comment.

Median modifications on Route 10 may be needed to prohibit exiting traffic from cutting across to the left-turn lane for Sorghum Mill Road.

We will work with DelDOT to resolve this comment.

It is recommended that sidewalks be provided throughout the community to encourage walking. It is also recommended that a multi-modal path, located in a 15-foot wide permanent easement, be required across the frontage of the site. If right-of-way is available, that path should be extended west to Grand Oaks Drive.

We understand the recommendation to provide pedestrian circulation within the community. However, we disagree with constructing a multi-modal path across the frontage of the subject property since there are no other paths in the vicinity. Furthermore, we will not be responsible for the design and construction of a multi-modal path from the western property line of the subject property to Grand Oaks Drive.

Delaware Transit Corporation (DTC) is interested in working with this development to establish a bus stop at the entrance. The development is located on Bus Route 105, which provides service between downtown Dover and the Gateway South shopping center by way of South State Street. DTC will work with the developer at the appropriate time to provide our bus stop specifications information, making sure the bus stop will be accessible and meet American with Disabilities Act standards. The person to contact for bus stop specification information and costs is our Facility Coordinator for Kent County, Mr. Charlie Simpson, at (302) 760-2806.

We will contact Delaware Transit Corporation to discuss.



You should contact the DelDOT Subdivision Manager for Kent County, Mr. George Shaw, regarding comments 1 through 5 and 7 above and more generally about our requirements with regard to the design of the site entrance. Mr. Shaw may be reached at (302) 760-2261. DelDOT stated that Mr. Shaw is retiring at the end of August. While he will be replaced, it is recommended that you document any verbal understandings that might exist regarding this project.

We will contact DelDOT to discuss their comments, and the site entrance design.

# The Department of Natural Resources and Environmental Control

#### Soils

According to the soil survey update, the following soils were found in the immediate vicinity of the proposed construction and grouped on the basis of drainage class:

Well drained – Sassafras
Very poorly drained (hydric) –Johnston (floodplain)

Sassafras is a well-drained upland soil with few limitations for development. Johnston is a very poorly-drained wetland associated (hydric) floodplain soil that has severe limitations for development.

No response required.

#### **TMDLs**

Although Total Maximum Daily Loads (TMDLs) as a "pollution runoff mitigation strategy" to reduce nutrient loading have not yet been developed for most of the tributaries or subwatersheds of the Delaware Bay watershed to date, work is continuing on their development. TMDLs for the St. Jones subwatershed, of which this parcel is part, are scheduled for completion in December 2006.

The Delaware Nutrient Management Commission (DNMC) is the controlling authority for fertilizer application on parcels of land 10 acres in size or greater within the watershed. Consequently, the open space will be managed for nutrients in accordance with Delaware Nutrient Management Law. Thus, the owner's association will be responsible for the managing that open space and should be made aware of that fact.

Therefore, until the specified TMDL reductions and pollution control strategies are adopted, it shall be incumbent upon the developer to employ best available technologies (BATS) and/or best management practices (BMPs) as "methodological mitigative strategies" to reduce degradative impacts associated with development.

No response required.

## Water Supply

Should dewatering points be needed during any phase of construction, a dewatering well construction permit must be obtained from the Water Supply Section prior to construction





of the well points. In addition, a water allocation permit will be needed if the pumping rate will exceed 50,000 gallons per day at any time during operation.

All well permit applications must be prepared and signed by licensed water well contractors, and only licensed well drillers may construct the wells. Please factor in the necessary time for processing the well permit applications into the construction schedule. Dewatering well permit applications typically take approximately four weeks to process, which allows the necessary time for technical review and advertising.

Should you have any questions concerning these comments, please contact Rick Rios at 302-739-3665.

No response required.

## **Stormwater Management**

Source: Delaware Sediment and Stormwater Regulations

#### Requirements:

- 1. Land disturbing activities in excess of 5,000 square feet are regulated under the Delaware Sediment and Stormwater Regulations. A detailed sediment and stormwater management plan must be reviewed and approved by our office prior to any land disturbing activity (i.e. clearing, grubbing, filling, grading, etc.) taking place.
- 2. The review fee and a completed Application for Detailed Plan are due at the time of plan submittal to our office. Construction inspection fees based on developed area and stormwater facility maintenance inspection fees based on the number of stormwater facilities are due prior to the start of construction. Please refer to the fee schedule for those amounts.
- 3. The following notes must appear on the record plan:
  - The Kent Conservation District reserves the right to enter private property for purposes of periodic site inspection.
  - The Kent Conservation District reserves the right to add, modify, of delete any erosion or sediment control measure, as it deems necessary.
  - A clear statement of defined maintenance responsibility for stormwater management facilities must be provided on the Record Plan.
- 4. All drainage ways and storm drain should be contained within drainage easements and clearly shown on the plan to be recorded by Kent County.
- 5. A soils investigation supporting the stormwater management facility design is required for any basin design to determine impacts of the seasonal high groundwater level and soils for any basin design. The soils in the vicinity of the project are sandy and may preclude the use of wet basins.

We will comply with the Delaware Sediment and Stormwater Regulations.

#### Comments:

The project site is bordered on the North and East by steep slopes which fall into the Planter's Run Subdivision. Care should be taken to avoid disturbance to those slopes.



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We will work the Kent Conservation District to avoid disturbance to the steep slopes along the Planter's Run subdivision.

2. The preferred methods of stormwater management are those practices that maximize the use of the natural features of a site, promote recharge and minimize the reliance on structural components.

No response required.

3 It is recommended that the stormwater management areas be incorporated into the overall landscape plan to enhance water quality and to make the stormwater facility an attractive community amenity.

No response required.

4. A letter of *No Objection* to recordation will be provided once the detailed Sediment and Stormwater Management plan has been approved.

No response required.

5. Based on the site characteristics, a pre-application meeting is suggested to discuss stormwater management and drainage for this site.

We will schedule a pre-application meeting with Kent Conservation District during the preliminary site plan phase.

#### Drainage

The Drainage Section does not have any knowledge of existing drainage complaints or concerns associated with the project. The Drainage Section does ask that all precautions be taken to ensure the project does not hinder any off site drainage upstream of the project or create any off site drainage problems downstream by the release of on site storm water.

No response required.

# Rare/Threatened/Endangered Species

There is an active Bald Eagle nest site located within the 'Windswept' subdivision just north of the project area. Bald eagle nesting areas retain protection under the federal Endangered Species Act. All habitat within 750 feet of the nest is protected; no activity is permitted within this zone at any time of the year. Any work proposed within a secondary protection zone defined as the area between 750 feet and 1,320 feet from the nest will be under time-of-year restriction; no activity is permitted within this zone from 15 December to 1 July. A portion of the project area appears to be within this secondary protection zone and because the Bald Eagle is a federally listed species, you or your client will need to contact the U.S. Fish and Wildlife Service (USFWS), as any decisions on federally listed species are ultimately their jurisdictions. Please contact USFWS biologist Craig Koppie at (410) 573-4534.

We will contact U.S. Fish and Wildlife Service to determine the limits of the protection zone on the subject property.



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#### Recreation

It is recommended that sidewalks be built fronting every residence and stub streets. A complete system of sidewalks will: 1) fulfill the recreation need for walking and biking facilities 2) provide opportunities for neighbors to interact in the community and 3) facilitate safe, convenient off-road access to neighboring communities, public mass transit stops, schools, stores, work etc.

No response required.

Single point of entry projects reduces mobility opportunities forcing residents to be autodependent. We recommend that a bike and pedestrian pathway be provided on the west boundary of the property and along Route 10. Because of the steep slopes on the North and East boundaries, we do not recommend pathways at these locations.

No response required.

The Division of Parks and Recreation conducted a telephone survey of Delaware residents to gather information on outdoor recreation patterns and preferences as well as other information on their landscape perception. These findings are the foundation of the 2003-2008 Statewide Comprehensive Outdoor Recreation Plan (SCORP) providing guidance for investments in needed outdoor recreation facilities. The high and moderate facility needs in Kent County are listed below. Consideration should be given to incorporate some of these recreation opportunities into the project.

**High Priorities Moderate Priorities** Walking or Jogging Paths **Skate Facilities** Bike Paths **Hiking Trails** 

**Swimming Pools** Baseball/Softball Fields

Picnic Areas Campgrounds Soccer Fields **Playgrounds** 

Volleyball Courts Fishing Areas

> **Basketball Courts** Canoe/Kayak Access

We will consider some of the above listed recreation opportunities during design.

#### **Air Quality**

Note: Comments for the air emission impacts of the 36 residential condominiums.

Air pollution threatens the health of human beings and other living things on our planet. While often invisible, pollutants in the air create smog and acid rain, cause cancer or other serious health effects, diminish the protective ozone layer in the upper atmosphere, and contribute to the potential for world climate change. Breathing polluted air can have numerous effects on human health, including respiratory problems, hospitalization for



heart or lung disease, and even premature death. Some can also have effects on aquatic life, vegetation, and animals.

Once complete, vehicle emissions associated with this project will be 2.8 tons (5,525.6 pounds) per year of VOC (volatile organic compounds), 2.3 tons (4,574.8 pounds) per year of NOx (nitrogen oxides), 1.7 tons (3,375.4 pounds) per year of SO2 (sulfur dioxide), 0.2 ton (300.5 pounds) per year of fine particulates and 231.1 tons (462,211.4 pounds) per year of CO2 (carbon dioxide)

Emissions from electrical power generation associated with this project will be 0.4 ton (883.3 pounds) per year of NOx (nitrogen oxides), 1.5 tons (3,072.4 pounds) per year of SO2 (sulfur dioxide) and 226.6tons (453,176.6 pounds) per year of CO2 (carbon dioxide).

Emissions from area sources\* associated with this project will be 1.1 tons (2,228.7 pounds) per year of VOC (volatile organic compounds), 0.1 ton (245.2 pounds) per year of NOx (nitrogen oxides), 0.1 ton (203.5 pounds) per year of SO2 (sulfur dioxide), 0.1 ton (262.6 pounds) per year of fine particulates and 4.5 tons (9,034.8 pounds) per year of CO2 (carbon dioxide)

	VOC	NOx	SO <sub>2</sub>	PM <sub>2.5</sub>	CO <sub>2</sub>
Mobile	2.8	2.3	1.7	0.2	231.1
Residential	1.1	0.1	0.1	0.1	4.5
Electrical Power		0.4	1.5		226.6
TOTAL	3.9	2.8	3.3	0.3	462.2

The Department of Natural Resources and Environmental Control is asking that local jurisdictions consider mitigation to help resolve this issue. Mitigation might involve limiting large new developments to growth zones, focusing development to urban areas capable of providing mass transit services, requiring more energy efficient homes which would lessen air quality impacts, and promoting walkability and bikability within and between developments and town centers.

With that said this State notes that this proposed development is within a growth area of Kent County. Therefore, the State would ask that you consider the development of energy efficient homes and interconnectivity with the surrounding commercial areas to promote walkability and bikeability.

No response required.

## **Underground Storage Tanks**

There are no LUST sites located near the proposed project. However, should any underground storage tank or petroleum contaminated soil be discovered during construction, the Tank Management Branch must be notified as soon as possible. It is not anticipated that any construction specifications would be needed to be changed due to petroleum contamination. However, should any unanticipated contamination be encountered and PVC pipe is being utilized, it will need to be changed to ductile steel in the contaminated areas.



No response required.

#### State Fire Marshal's Office

These comments are intended for informational use only and do not constitute any type of approval from the Delaware State Fire Marshal's Office. At the time of formal submittal, the applicant shall provide; completed application, fee, and three sets of plans depicting the following in accordance with the Delaware State Fire Prevention Regulation (DSFPR):

#### a. Fire Protection Water Requirements:

- Water distribution system capable of delivering at least 1500 gpm for 2-hour duration, at 20-psi residual pressure is required. Fire hydrants with 800 feet spacing on centers. (Mercantile)
- ➤ Water distribution system capable of delivering at least 1000 gpm for 1-hour duration, at 20-psi residual pressure is required. Fire hydrants with 800 feet spacing on centers. (Apartments)
- Where a water distribution system is proposed for the site, the infrastructure for fire protection water shall be provided, including the size of water mains for fire hydrants and sprinkler systems.

We will comply with the above listed requirements.

#### b. Fire Protection Features:

- All structures over 10,000 sq. ft. aggregate will require automatic sprinkler protection installed.
- ➤ Buildings greater than 10,000 sq. ft., 3-stories of more or over 35 feet, or classified as High Hazard, are required to meet fire lane marking requirements.
- > Show Fire Department Connection location (must be within 300 feet of fire hydrant), and detail as shown in the DSFPR.
- ➤ Show Fire Lanes and Sign Detail as shown in DSFPR

We will comply with the above listed requirements.

## **Accessibility**

- All premises which the fire department may be called upon to protect in case of fire, and which are not readily accessible from public roads, shall be provided with suitable gates and access roads, and fire lanes so that all buildings on the premises are accessible to fire apparatus. This means that the access road to the subdivision from Route 10 must be constructed so fire department apparatus may negotiate it.
- Fire department access shall be provided in such a manner so that fire apparatus will be able to locate within 100 ft. of the front door.
- Any dead end road more than 300 feet in length shall be provided with a turn-around or cul-de-sac arranged such that fire apparatus will be able to turn around by making not more than one backing maneuver. The minimum paved radius of the cul-de-sac shall be 38 feet. The dimensions of the cul-de-sac or turn-around shall be shown on the final plans. Also, please be advised that parking is prohibited in the cul-de-sac or turn around.



➤ If the use of speed bumps or other methods of traffic speed reduction must be in accordance with Department of Transportation requirements.

We will comply with the above listed requirements.

## d. Gas Piping and System Information:

Provide type of fuel proposed, and show locations of bulk containers on plan.

If gas piping and system are proposed, we will provide the above information.

## e. Required Notes:

- > Provide a note on the final plans submitted for review to read "All fire lanes, fire hydrants, and fire department connections shall be marked in accordance with the Delaware State Fire Prevention Regulations"
- > Proposed Use
- > Alpha or Numerical Labels for each building/unit for sites with multiple buildings/units
- > Square footage of each structure (Total of all Floors)
- > National Fire Protection Association (NFPA) Construction Type
- Maximum Height of Buildings (including number of stories)
- > Note indicating if building is to be sprinklered
- > Name of Water Provider
- > Letter from Water Provider approving the system layout
- Provide Lock Box Note (as detailed in DSFPR) if Building is to be sprinklered
- > Provide Road Names, even for County Roads

We will provide the required notes on the final plans.

Preliminary meetings with fire protection specialists are encouraged prior to formal submittal. Please call for appointment. Applications and brochures can be downloaded from our website: <a href="https://www.delawarestatefiremarshal.com">www.delawarestatefiremarshal.com</a>, technical services link, plan review, app

No response is required.

#### **Department of Agriculture**

Per relevant county codes, a forested buffer is required between the proposed subdivision and all adjacent properties in active agricultural use. In addition, a forest buffer should be maintained for those pre-existing residential properties and along all streams, wetlands, and river that border the proposed subdivision.

The developer should consider a diverse landscape plan that uses Delaware native tree and shrub species and encourages the "Right Tree for the Right Place" concept.

The subject property is not located adjacent to active agricultural use.





#### **Public Service Commission**

Property is in a certificated area for Tidewater Utilities, Inc.

Any expansion of natural gas or installation of a closed propane system must fall within Pipeline Safety guidelines.

No response is required.

#### **Delaware State Housing Authority**

This proposal is to rezone 7.3 acres for the purpose of building 36 condominiums and 10,000 square foot of commercial space. According to the applicant, these units will start at \$150,000 – which appears high for the market that high-density units, such as these, typically serve.

DSHA encourages the applicant to consider including prices that are affordable to moderate-income households as well. The provision of these units will help address the need for affordable homeownership that was identified in the 2003 Statewide Housing Needs Assessment.

No response required.

## **Delaware Emergency Management Agency**

An impact to public safety is foreseen by implementation of this project. Developer should notify the police, fire service, and emergency medical response organization serving this portion of Kent County, to keep them apprised of all development activities. Routes 10 and 113A are both coastal storm evacuation routes and this development will add to the traffic volume on these routes during a coastal storm event.

No response required.

If you should have any questions regarding the responses provided, please contact me directly.

Sincerely,

BECKER MORGAN GROUP, INC.

cense -3 seas

Garth E. Jones, P.E. Senior Civil Engineer

GEJ/rlh

cc: Mr. Joseph Petrosky

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